

**What is claimed is:**

1. A cellular communication system comprising  
a cell station which provides a  
communication service for a personal station,  
said cell station executing continuous monitoring  
5 of an interfering wave during a period and  
producing interference monitor data  
representative of a property of said interfering  
wave; and

a maintenance terminal which produces an  
10 interference profile based on said property.

2. The cellular communication system according  
to claim 1, wherein said cell station includes an  
antenna, and both of said communication service  
and said continuous monitoring are achieved  
5 through said antenna.

3. The cellular communication system according  
to claim 1, wherein said cell station includes a  
monitoring unit which continuously monitors an  
electric field intensity of said interfering wave  
5 during said period, and

said property includes said electric field  
intensity.

4. The cellular communication system according

to claim 1, wherein said maintenance terminal  
sends first and second requests, and

said cell station provides said  
5 communication service in response to said first  
request, and monitors said interfering wave in  
response to said second request.

5. The cellular communication system according  
to claim 1, wherein said maintenance terminal  
displays said interference profile.

6. The cellular communication system according  
to claim 1, wherein said communication service is  
executed based on a TDMA system protocol, and  
said period includes a slot determined by  
5 said TDMA system protocol.

7. The cellular communication system according  
to claim 6, wherein said cell station checks  
whether said slot is used for providing said  
communication service, and continuously monitors  
5 said interfering wave during said slot when said  
slot is not used for providing said communication  
service.

8. A cellular communication system comprising:  
a plurality of cell stations which provide

a communication service for a personal station,  
each of said cell stations continuously

5 monitoring an interfering wave during a period to  
produce interference monitor data representative  
of an electric field intensity of said  
interfering wave; and

a maintenance terminal which receives said  
10 interference monitor data from each of said cell  
stations and determines an incoming direction of  
said interfering wave based on said interference  
monitor data.

9. A method of operating a cellular  
communication system comprising:

providing a communication service for a  
personal station by a cell station;

5 continuously monitoring of an interfering  
wave during a period by said cell station;

producing an interference monitor data  
representative of a property of said interfering  
wave; and

10 producing an interference profile based on  
said property.

10. The method according to claim 9, wherein  
both of providing said communication service and  
said continuous monitoring are achieved through

the same antenna included in said cell station.

11. The method according to claim 9, wherein  
said monitoring includes continuously monitoring  
an electric field intensity of said interfering  
wave during said period, and said property  
5 includes said electric field intensity.

12. The method according to claim 9, further  
comprising receiving a request by a user  
interface, wherein said providing said  
communication service and said continuously  
5 monitoring said interfering wave are exclusively  
executed in response to said request.

13. The method according to claim 9, wherein  
said communication service is executed based on a  
TDMA system protocol, and said period includes a  
slot determined by said TDMA system protocol.

14. The method according to claim 13, further  
comprising checking whether said slot is used for  
providing said communication service, wherein  
said continuously monitoring is executed during  
5 said slot when said slot is not used for  
providing said communication service.

15. A method of operating a cellular communication system comprising:

providing a communication service for a personal station by a plurality of cell stations;

5 continuously monitoring of an interfering wave during a period by said plurality of cell stations cell stations;

producing interference monitor data representative of electric field intensities of  
10 said interfering wave by each of said plurality of cell stations cell stations; and

determining an incoming direction of said interfering wave based on said interference monitor data.